REMARKS

The Applicant thanks the Examiner for the telephonic interview conducted on November 5, 2003. The applicant cancels claims 1-6 and 36-41 and 46 without prejudice. Claims 42-45 and 47-61 are pending. This reply is being submitted with a Request for Continued Examination (RCE).

In the action dated May 6, 2003, the Examiner rejected claim 42 under 35 U.S.C. 103(a) in view of U.S. 6,361,942 ("Coull"), U.S. 6,103,474 ("Dellinger") and U.S. 6,261,797 ("Sorge").

As presently amended, the method of claim 42 uses a probe molecule that includes a region of sequence substantially complementary to a sequence in the target nucleic acid sequence and a capture tag sequence that is internal to a nucleic acid strand of the probe molecule. If the target nucleic acid sequence is present and the probe molecule is cleaved, the cleaved probe molecule can be detected by hybridizing the tag sequences to capture probes disposed on a substrate. Note that the detection involves a part of the probe molecule – the tag sequence that is now at a terminus of the probe molecule and was previously internal to the probe molecule.

Neither Coull nor Dellinger teach a method in which a probe molecule is cleaved such that an internal capture tag sequence is positioned at a terminus by the cleavage and then is detected by hybridizing the tag sequence to capture probes disposed on a substrate.

Sorge does not remedy this deficiency of Coull and Dellinger. The cleavage event in Sorge is to remove "some or all primer-derived nucleotides" so that an amplified sequence can be cloned cleanly into a plasmid. The implication of Sorge is that the excised primer-derived nucleotides are discarded. Sorge does not teach or suggest using a primer-derived sequence that is positioned at a terminus by cleavage to detect a target nucleic acid.

In contrast, the method of claim 42 does detect a primer-derived sequence – the capture tag sequence that is positioned at a terminus, if a target is present. Further, the capture tag sequence is detected by hybridizing a capture tag sequence to capture probes disposed on a substrate. Thus, even assuming a motivation to combine Sorge with Coull and Dellinger, the combination fails to teach a method in which a probe molecule that includes an internal capture

tag sequence is cleaved such that the capture tag sequence is at a terminus and then is detected by hybridizing the tag sequence to capture probes disposed on a substrate.

The Applicant does not concede any positions of the Examiner that are not expressly addressed above, nor does the Applicant concede that there are not other good reasons for patentability of the presented claims or other claims.

The Applicant asks that all claims be allowed. Enclosed is a $950 check for the Petition for Extension of Time fee. Please apply any other charges or credits to deposit account 06-1050, referencing attorney docket number 10296-050001.

Respectfully submitted,

Date: 5/10/05

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